

Data sheet for SIMOTICS M-1PH8

Client order no. : Order no. :

Offer no. :

Remarks:

Article No.:







Engineering data

Project :

| | | P _N [kW] | M _N [Nm] | I _N | U _N [V] | f _N [Hz] | n _N [rpm] | M _{max} [Nm] | I _{max} [A] | n _{max} [rpm] | M ₀ [Nm] | l ₀ [A] | η | cos φ | Ιμ [A] |
|---|------------------|------------------------|------------------------|----------------|-----------------------|------------------------|-------------------------|--------------------------|-------------------------|---------------------------|------------------------|-----------------------|-------|-------|-----------|
| Υ | ALM 400V | 12.0 | 50.0 | 26.0 | 406 | 78.6 | 2,300 | 120 | 60.0 | 9,000 | 63.0 | 29 | 0.909 | 0.780 | 13.0 |
| | BLM/SLM 400V | 10.5 | 50.0 | 26.0 | 355 | 68.6 | 2,000 | 120 | 60.0 | 9,000 | 63.0 | 29 | 0.897 | 0.780 | 12.9 |
| | ALM/BLM/SLM 480V | 13.0 | 47.0 | 24.0 | 460 | 90.0 | 2,650 | 120 | 60.0 | 9,000 | 63.0 | 29 | 0.932 | 0.770 | 12.8 |

| Mechanical data | | | | | |
|---------------------------|---|--|--|--|--|
| Motor type | Squirrel cage asynchronous motor | | | | |
| Shaft height | 100 | | | | |
| Cooling | Forced ventilation DE -> NDE | | | | |
| Vibration severity grade | R/A | | | | |
| Shaft and flange accuracy | R | | | | |
| Degree of protection | IP55 | | | | |
| Design acc. to Code I | IM B5 (IM V1, IM V3) | | | | |
| Temperature monitoring | Pt1000 temperature sensor in the stator winding | | | | |
| Color | Jet black, matt RAL 9005 | | | | |
| Type of the bearing | Standard with fixed bearing | | | | |
| Shaft end | Feather key with half key balancing | | | | |
| Encoder system | Incremental encoder 22 bit with commutation position 11 bit, max. encoder speed = 12000 rpm | | | | |

| Physical constants | | | | |
|-----------------------|-----------|--|--|--|
| Thermal time constant | 20 min | | | |
| Moment of inertia | 289 kgcm² | | | |
| Weight (approx.) | 73 kg | | | |

| Connection | | | |
|-------------------------------|--------------|--|--|
| Type of electrical connection | Terminal box | | |
| Position of the connection | NDE top | | |
| Power connection | right | | |
| Signal connection | DE | | |
| Terminal box designation | gk813 | | |

| Cooling data and s | ound pressure level |
|---|---------------------|
| Airflow, min. | 0.04 m³/s |
| Sound pressure level LpA(1m) motor + external fan operation 50 HZ rated load, tolerance + 3dB | 70 dB ¹⁾ |
| Air discharge | axial |
| Pressure drop | 110 Pa |

| | External fan | | | | | |
|---|---------------------------|--------|--|--|--|--|
| Ν | Max. power consumption | | | | | |
| | 3 AC 400 V / 50 Hz (±10%) | 0.10 A | | | | |
| | 3 AC 400 V / 60 Hz (±10%) | 0.08 A | | | | |
| | 3 AC 480 V / 60 Hz (±10%) | 0.11 A | | | | |
| | Special design | | | | | |

Paint finish: Jet black, matt RAL 9005

 $^{^{\}rm 1)}{\rm at}~{\rm a}~{\rm rated}~{\rm frequency}~{\rm of}~4~{\rm kHz}~{\rm and}~{\rm a}~{\rm speed}~{\rm range}~{\rm of}~{\rm up}~{\rm to}~5000~{\rm rpm}$